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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/787,416	06/15/2001	Herbert Gord		7556

7590 11/03/2003

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EXAMINER

PIAZZA CORCORAN, GLADYS JOSEFINA

ART UNIT	PAPER NUMBER
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1733

DATE MAILED: 11/03/2003

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Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

09/787,416

Examiner

Gladys J Piazza Corcoran

Applicant(s)

GORD ET AL.

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☐ Responsive to communication(s) filed on ____.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-24 is/are pending in the application.
- 4a) Of the above claim(s) ____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) ____ is/are allowed.
- 6) ☒ Claim(s) 1-24 is/are rejected.
- 7) ☐ Claim(s) ____ is/are objected to.
- 8) ☐ Claim(s) ____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on ____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on ____ is: a) ☐ approved b) ☐ disapproved by the Examiner.
- If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

- 13) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. ____.
3. ☒ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
- a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO-1449) Paper No(s) 5.
- 4) ☐ Interview Summary (PTO-413) Paper No(s). ____.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other:

DETAILED ACTION

Drawings

1. The drawings are objected to as failing to comply with 37 CFR 1.84(p)(5) because they do not include the following reference sign(s) mentioned in the description: The Specification on page 7, line 13 recites a grid cylinder 40, however there is no reference number 40 in the drawings. A proposed drawing correction or corrected drawings or an amendment to the Specification are required in reply to the Office action to avoid abandonment of the application. The objection to the drawings will not be held in abeyance.

Claim Objections

2. Claim 14 is objected to under 37 CFR 1.75(c), as being of improper dependent form for failing to further limit the subject matter of a previous claim. Applicant is required to cancel the claim(s), or amend the claim(s) to place the claim(s) in proper dependent form, or rewrite the claim(s) in independent form. The material worked upon is not given weight in apparatus claims, see MPEP 2115.
3. Claim 24 is objected to under 37 CFR 1.75(c), as being of improper dependent form for failing to further limit the subject matter of a previous claim. Applicant is required to cancel the claim(s), or amend the claim(s) to place the claim(s) in proper dependent form, or rewrite the claim(s) in independent form. The material worked upon is not given weight in apparatus claims, see MPEP 2115.

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4. Claims 1-12 are objected to because of the following informalities: Claim 1, line 4 recites "with overlapping longitudinal seam" which should be --with an overlapping longitudinal seam--. Appropriate correction is required.

5. Claim 23 is objected to because of the following informalities: Claim 23, line 2 recites, "return fol" which should be --return roll--. Appropriate correction is required.

Claim Rejections - 35 USC § 112

6. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

7. Claims 1-24 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

8. Claim 1 recites the limitation "the nozzle block" in **line 5**. There is insufficient antecedent basis for this limitation in the claim. It is suggested to amend to --a nozzle block--.

9. Claim 1 recites the limitation "the tube" in **lines 8 and 9**. There is insufficient antecedent basis for this limitation in the claim. It is suggested to amend to --the cemented tube--.

10. Claim 2 is unclear by reciting in line 2, "are applied by one of the known methods such as roller application." It is unclear what Applicant intends by reciting "the known methods", thus the scope of the claim is unclear. It is also unclear as to whether Applicant is positively reciting the step of roller application.

11. Claim 10 is unclear by reciting, "at a temperature of 15-110 C, especially at the temperature of the cellulose-NMMO solution extruded in the nozzle block." It is unclear whether the claim requires that the temperature be between 15-110C or be at the temperature of the cellulose-NMMO solution extruded in the nozzle block or both.

12. A broad range or limitation together with a narrow range or limitation that falls within the broad range or limitation (in the same claim) is considered indefinite, since the resulting claim does not clearly set forth the metes and bounds of the patent protection desired. Note the explanation given by the Board of Patent Appeals and Interferences in *Ex parte Wu*, 10 USPQ2d 2031, 2033 (Bd. Pat. App. & Inter. 1989), as to where broad language is followed by "such as" and then narrow language. The Board stated that this can render a claim indefinite by raising a question or doubt as to whether the feature introduced by such language is (a) merely exemplary of the remainder of the claim, and therefore not required, or (b) a required feature of the claims. Note also, for example, the decisions of *Ex parte Steigewald*, 131 USPQ 74 (Bd. App. 1961); *Ex parte Hall*, 83 USPQ 38 (Bd. App. 1948); and *Ex parte Hasche*, 86 USPQ 481 (Bd. App. 1949). In the present instance, claim 11 recites the broad recitation 1 to 15 wt.%, and the claim also recites 3 to 7 wt.% which is the narrower statement of the range/limitation.

13. A broad range or limitation together with a narrow range or limitation that falls within the broad range or limitation (in the same claim) is considered indefinite, since the resulting claim does not clearly set forth the metes and bounds of the patent protection desired. Note the explanation given by the Board of Patent Appeals and

Interferences in *Ex parte Wu*, 10 USPQ2d 2031, 2033 (Bd. Pat. App. & Inter. 1989), as to where broad language is followed by "such as" and then narrow language. The Board stated that this can render a claim indefinite by raising a question or doubt as to whether the feature introduced by such language is (a) merely exemplary of the remainder of the claim, and therefore not required, or (b) a required feature of the claims. Note also, for example, the decisions of *Ex parte Steigewald*, 131 USPQ 74 (Bd. App. 1961); *Ex parte Hall*, 83 USPQ 38 (Bd. App. 1948); and *Ex parte Hasche*, 86 USPQ 481 (Bd. App. 1949). In the present instance, claim 11 recites the broad recitation 250 to 800, and the claim also recites 300 to 500 which is the narrower statement of the range/limitation.

14. A broad range or limitation together with a narrow range or limitation that falls within the broad range or limitation (in the same claim) is considered indefinite, since the resulting claim does not clearly set forth the metes and bounds of the patent protection desired. Note the explanation given by the Board of Patent Appeals and Interferences in *Ex parte Wu*, 10 USPQ2d 2031, 2033 (Bd. Pat. App. & Inter. 1989), as to where broad language is followed by "such as" and then narrow language. The Board stated that this can render a claim indefinite by raising a question or doubt as to whether the feature introduced by such language is (a) merely exemplary of the remainder of the claim, and therefore not required, or (b) a required feature of the claims. Note also, for example, the decisions of *Ex parte Steigewald*, 131 USPQ 74 (Bd. App. 1961); *Ex parte Hall*, 83 USPQ 38 (Bd. App. 1948); and *Ex parte Hasche*, 86 USPQ 481 (Bd. App. 1949). In the present instance, claim 12 recites the broad

recitation 5-50 wt.%, and the claim also recites 8-20 wt.% which is the narrower statement of the range/limitation.

15. A broad range or limitation together with a narrow range or limitation that falls within the broad range or limitation (in the same claim) is considered indefinite, since the resulting claim does not clearly set forth the metes and bounds of the patent protection desired. Note the explanation given by the Board of Patent Appeals and Interferences in *Ex parte Wu*, 10 USPQ2d 2031, 2033 (Bd. Pat. App. & Inter. 1989), as to where broad language is followed by "such as" and then narrow language. The Board stated that this can render a claim indefinite by raising a question or doubt as to whether the feature introduced by such language is (a) merely exemplary of the remainder of the claim, and therefore not required, or (b) a required feature of the claims. Note also, for example, the decisions of *Ex parte Steigewald*, 131 USPQ 74 (Bd. App. 1961); *Ex parte Hall*, 83 USPQ 38 (Bd. App. 1948); and *Ex parte Hasche*, 86 USPQ 481 (Bd. App. 1949). In the present instance, claim 12 recites the broad recitation 0 to 50 C, and the claim also recites 2 to 20 C which is the narrower statement of the range/limitation.

16. Claim 13 recites the limitation "the circuit" in line 8. There is insufficient antecedent basis for this limitation in the claim.

17. Claim 13 recites the limitation "the tube" in line 10. There is insufficient antecedent basis for this limitation in the claim. It is suggested to amend to --the preheated tube--.

18. Claim 13 recites the limitation "the tube" in line 13. There is insufficient antecedent basis for this limitation in the claim. It is suggested to amend to --the preheated and cemented tube--.

19. Claim 13 is unclear by reciting, "and that the tube (6) passes through the nozzle block (7) which is preceded by a cementing system (25) for cementing the longitudinal seam and which contains an annular nozzle (21) from whose nozzle gap the cellulose-NMMO solution is applied to the tube (6) pre-heated to the temperature of the extrusion solution of the formation of the film tube (10)." It is unclear which limitations refer to the nozzle block and which limitations refer to the cementing system. It is suggested to amend the claim to recite, -- and that the pre-heated tube (6) passes through a cementing system (25) for cementing the longitudinal seam and then passes through the nozzle block (7) which contains an annular nozzle (21) from whose nozzle gap the cellulose-NMMO solution is applied to the preheated and cemented tube (6) pre-heated to the temperature of the extrusion solution of the formation of the film tube (10)--.

20. Claim 15 recites the limitation "the drawing of the insert" in line 2. There is insufficient antecedent basis for this limitation in the claim. It is suggested to amend to -drawing the insert--.

21. Claim 15 recites the limitation "the hot open air section" in lines 4-5. There is insufficient antecedent basis for this limitation in the claim. It is suggested to amend to -the preheating system--.

22. Claim 16 recites the limitation "the delivery tube" in line 3. There is insufficient antecedent basis for this limitation in the claim. It is suggested to amend to --a delivery tube--.
23. Claim 16 recites the limitation "the removal tube" in line 3. There is insufficient antecedent basis for this limitation in the claim. It is suggested to amend to --a removal tube--.
24. Claim 16 recites the limitation "the duct" in line 3. There is insufficient antecedent basis for this limitation in the claim. It is suggested to amend to --a duct--.
25. Claim 16 recites the limitation "the air supporting the film tube" in line 10. There is insufficient antecedent basis for this limitation in the claim. It is suggested to amend to --supporting the film tube with air--.
26. Claim 17 recites the limitation "the heating circuit" in line 2. There is insufficient antecedent basis for this limitation in the claim. It is suggested to define the heating circuit in the independent claim 13.
27. Claim 19 recites the limitation "the return roll (13)" in line 4. There is insufficient antecedent basis for this limitation in the claim. It is suggested to define the return roll in the claim 13.
28. Claim 20 recites the limitation "the heating medium" in line 2. There is insufficient antecedent basis for this limitation in the claim. It is suggested to amend to -hot air--.

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29. Claim 20 recites the limitation "the air section (9)" in lines 2 and 4. There is insufficient antecedent basis for this limitation in the claim. It is suggested to define the air section in the claim 13.

30. A broad range or limitation together with a narrow range or limitation that falls within the broad range or limitation (in the same claim) is considered indefinite, since the resulting claim does not clearly set forth the metes and bounds of the patent protection desired. Note the explanation given by the Board of Patent Appeals and Interferences in *Ex parte Wu*, 10 USPQ2d 2031, 2033 (Bd. Pat. App. & Inter. 1989), as to where broad language is followed by "such as" and then narrow language. The Board stated that this can render a claim indefinite by raising a question or doubt as to whether the feature introduced by such language is (a) merely exemplary of the remainder of the claim, and therefore not required, or (b) a required feature of the claims. Note also, for example, the decisions of *Ex parte Steigewald*, 131 USPQ 74 (Bd. App. 1961); *Ex parte Hall*, 83 USPQ 38 (Bd. App. 1948); and *Ex parte Hasche*, 86 USPQ 481 (Bd. App. 1949). In the present instance, claim 21 recites the broad recitation 1 to 1000 mm, and the claim also recites 200 to 500 mm which is the narrower statement of the range/limitation.

31. Claim 22 recites the limitation "the return roll" in line 2. There is insufficient antecedent basis for this limitation in the claim. It is suggested to define the return roll in the claim 13.

32. Claim 22 recites the limitation "the spin tub (12)" in line 2. There is insufficient antecedent basis for this limitation in the claim. It is suggested to amend to --the spin bath (11)--.

33. Claim 23 recites the limitation "the return roll" in line 2. There is insufficient antecedent basis for this limitation in the claim. It is suggested to define the return roll in the claim 13.

Allowable Subject Matter

34. Claims 1-24 would be allowable if rewritten or amended to overcome the rejection(s) under 35 U.S.C. 112, second paragraph, set forth in this Office action.

35. The following is a statement of reasons for the indication of allowable subject matter:

It is known in the art (as shown by Smith (US Patent No. 2,105,273)) to a method and apparatus for producing a film on a cellulose basis by extruding cellulose on an insert drawn from a Rolland formed into a tube with an overlapping seam, cementing the seam, and carrying the tube through a nozzle block to apply cellulose solution, filling the interior of the film tube with aqueous solution, and entering the tube into a spin bath (column 1, lines 49-60). Although Smith discloses the tube can be preheated (drier M; column 3, lines 5-15), the preheating is done prior to the forming step and not after the insert is formed into a tube as required by the claims. It is noted that Smith discloses that the solution is of a cellulose base, furthermore, it is also known to substitute NMMO cellulose solution as an environmentally favorable solution as shown by Kajiwara et al. (US Patent No. 5,658,525). It is further known in the art (Milne (US Patent No.

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2,979,114) to apply heat to a cemented seam of cellulose tubes, but such heating is after the cementing system and not before.


Absent any additional art, no prior art was found to show or suggest a method or apparatus for producing film on a cellulose basis where an insert is formed into a tube in a forming section, then the tube is preheated in a preheating system, then the tube is cemented in a cementing system and then solution is extruded onto the tube through a nozzle block, and finally the tube enters a spin bath in the claimed environment.

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Gladys J Piazza Corcoran whose telephone number is (703) 305-1271. The examiner can normally be reached on M-F 8am-5:30pm (alternate Fridays off).

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Michael Ball can be reached on (703) 308-2058. The fax phone number for the organization where this application or proceeding is assigned is (703) 872-9306.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 308-0661.


Gladys J Piazza Corcoran
Examiner
Art Unit 1733

GJPC